

**WHAT IS CLAIMED:**

1. A method for forming a database indexed with content-based parameters corresponding to recordings of contacts to a contact center, the contact center being operable to present a contacting party with a contact that includes an automated portion corresponding to interaction with an automated response interface and, at the contacting party's option, an agent portion corresponding to interaction with an agent, events occurring in the recordings of automated portions being ascertained by previously executed automated-portion analysis techniques, said method comprising the steps of:

selecting content-based parameters to be used as indices in a database;

analyzing results of the automated-portion analysis techniques to detect occurrence of events corresponding to the selected parameters;

analyzing one or more agent portions of recordings of contacts to ascertain events occurring therein;

correlating events occurring in the one or more agent portions of the recordings with corresponding ones of the selected parameters; and

making entries in the database based on the selected parameters and the correlated events.

2. A method according to Claim 1, wherein the contact center is a call processing center, the contacts to the contact center are calls to the call processing center, and the automated response interface comprises an interactive voice response (IVR) unit.

3. A method according to Claim 2, wherein the content-based parameters include parameters corresponding to semantic annotations, which include annotations corresponding to characteristics of a call, a content of the call, and a quality of the call.

4. A method according to Claim 1, wherein the content-based parameters include at least one of a mention of an entity name, a completion of a specified transaction, a request for a specified transaction, and a request for a specified service.

5. A system for forming a database indexed with content-based parameters corresponding to recordings of contacts to a contact center, the contact center being operable to present a contacting party with a contact that includes an automated portion corresponding to interaction with an automated response interface and, at the contacting party's option, an agent portion corresponding to interaction with an agent, said system comprising:

analysis means operable to perform automated-portion analysis techniques to ascertain predetermined events occurring in recordings of automated portions of contacts to a contact center;

mining means operable to perform audio mining of recordings of agent portions of the contacts to the contact center, said mining means including:

a speech/non-speech detector operable to identify speech and non-speech events in an audio recording;

a speaker-change detector operable to identify speaker turns in an audio recording;

a speech recognizer operable to output a sequence of words for each speaker turn identified by the speaker-change detector;

a topic detector operable to determine a topic of an audio recording; and

a named-entity detector operable to identify speech pertaining to an entity named in an audio recording; and

correlation means operable to correlate an event occurring in an agent portion of the recordings with a corresponding one of a plurality of content-based parameters selected to be used as indices of a database, and to make an entry in the database based on the correlated event and the corresponding content-based parameter.

6. A system according to Claim 5, wherein the contact center is a call processing center, the contacts are calls to the call processing center, and the automated response interface comprises an interactive voice response (IVR) unit.

7. A system according to Claim 6, wherein the plurality of content-based parameters include parameters corresponding to semantic annotations, which include annotations corresponding to characteristics of the call, a content of the call, and a quality of the call.

8. A system according to Claim 5, wherein the content-based parameters include at least one of a mention of an entity name, a completion of a specified transaction, a request for a specified transaction, and a request for a specified service.

9. A computer program product embodying a program for implementing a method for forming a database indexed with content-based parameters corresponding to recordings of contacts to a contact center, the contact center being operable to present a contacting party with a contact that includes an automated portion corresponding to interaction with an automated response interface and, at the contacting party's option, an agent portion corresponding to interaction with an agent, events occurring in the recordings of automated portions being ascertained by previously executed automated-portion analysis techniques, said computer program product comprising code for:

selecting content-based parameters to be used as indices in a database;

analyzing results of the automated-portion analysis techniques to detect occurrence of events corresponding to the selected parameters;

analyzing one or more agent portions of recordings of contacts to ascertain events occurring therein;

correlating events occurring in the one or more agent portions of the recordings with corresponding ones of the selected parameters; and

making entries in the database based on the selected parameters and the correlated events.

10. A computer program product according to Claim 9, wherein the contact center is a call processing center, a contact is a call to the call processing center, and the automated response interface comprises an interactive voice response (IVR) unit.

11. A computer program product according to Claim 10, wherein the content-based parameters include parameters

corresponding to semantic annotations, which include annotations corresponding to characteristics of a call, a content of the call, and a quality of the call.

12. A computer program product according to Claim 9, wherein the content-based parameters include at least one of a mention of an entity name, a completion of a specified transaction, a request for a specified transaction, and a request for a specified service.